

**AMENDMENTS TO THE CLAIMS**

The listing of claims will replace all prior versions, and listings, of claims in the application:

**Listing of Claims:**

1. (Currently Amended) A method for load balancing code execution, said method comprising:
 

compiling a first source code subtask and a second source code subtask, the compiling resulting in a first byte code subtask and a second byte code subtask; translating the first byte code subtask to a first object code subtask; executing the first object code subtask using one of a plurality of heterogeneous processor types; during the execution of the first object code subtask, the method further comprises:

retrieving the second byte code subtask ~~at runtime~~ using a runtime loader; in response to retrieving the second byte code subtask, using the runtime loader to identify a processor type from [[a]] the plurality of heterogeneous processor types in which to execute the second byte code subtask, wherein the identifying includes retrieving a loading factor for each of the plurality of heterogeneous processor types and determining an availability of each of the plurality of heterogeneous processor types using the loading factors;

in response to identifying the processor type, using the runtime loader to translate the second byte code subtask to a second object code subtask; and

loading the second object code subtask into a processor that corresponds to the identified processor type.

2. (Canceled)
3. (Canceled)
4. (Currently Amended) The method as described in claim 1 further comprising:  
determining whether to store a pointer in a byte code file, the pointer including a stored location that corresponds to the second byte code subtask;  
storing the pointer in the byte code file in response to the determination;  
storing the second byte code subtask at the stored location in response to the determination; and  
performing the retrieving using the pointer, wherein the retrieving includes analyzing the stored location and retrieving the second byte code subtask in response to the analyzing.
5. (Canceled)
6. (Canceled)
7. (Canceled)
8. (Canceled)
9. (Canceled)
10. (Canceled)
11. (Canceled)
12. (Canceled)
13. (Canceled)
14. (Canceled)
15. (Canceled)

16. (Canceled)
17. (Canceled)
18. (Canceled)
19. (Canceled)
20. (Canceled)